REMARKS

Applicant respectfully requests entry of the amendments and remarks submitted herein. Claims 1-3 and 7 have been amended, and claims 6, 9, and 15-17 have been canceled. Therefore, claims 1-5, 7, 8, and 10-14 are currently pending. Attached is a marked-up version of the changes being made by the current amendments. Reconsideration of the pending application is respectfully requested.

Sequence Compliance

The Examiner noted that claim 6 of the instant application recites mutagenizing concanavalin A at specific amino acid positions, and stated that MPEP §2422.02 and 37 CFR §1.821(b) requires exclusive conformance with the sequence rules for all applications that include nucleotide sequences that fall within the definitions.

Applicant has herein canceled claim 6. Therefore, the present application does not require a Sequence Listing under 37 CFR §1.821-1.825.

Objections under 35 U.S.C. §132

The amendment received September 30, 2002 is objected to under 35 U.S.C. §132 because it introduces new matter into the disclosure. The Examiner indicated that 35 U.S.C. §132 states that no amendment shall introduce new matter into the disclosure of the invention. The Examiner asserted that the added material is not supported by the original disclosure.

Applicant has herein amended the specification to remove the material introduced in the amendment of September 30, 2002. Accordingly, the objection to the specification under 35 U.S.C. §132 is moot.

The specification additionally stands objected to because the Examiner stated that the incorporation of essential material in the specification by reference to a foreign application or patent, or to a publication is improper. The Examiner stated that Applicant is required to amend the disclosure to include the material incorporated by reference.

Applicant has amended the specification to remove the material introduced in the Response received September 30, 2002. Therefore, Applicant respectfully submits that the objection to the specification under 35 U.S.C. §132 is moot.

The 35 U.S.C. §112 Rejections

Claims 1-17 stand rejected under 35 U.S.C. §112, first paragraph, as the Examiner asserted that those claims contain subject matter that was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventors, at the time the application was filed, had possession of the claimed invention. Applicant respectfully traverses this rejection.

The Examiner asserted that the specification fails to provide adequate written description for the claimed genus of recombinant reduced valency CBLs because it does not disclose representative species encompassing fragments and analogs including mutagenized residues. The Examiner asserted that the specification does not provide defined mutations at specific amino acid positions, or describe the genus by structure, physical or chemical characteristics, function correlated with structure, or a combination of each aforementioned, sufficient to establish that the Applicant had possession of the claimed invention.

Applicant has amended claim 1 to remove the word "recombinant." Therefore, Applicant respectfully submits that the rejection of claims 1-17 under 35 U.S.C. §112, first paragraph, is moot.

Claims 1-17 stand rejected under 35 U.S.C. §112, first paragraph, as the Examiner asserted that those claims contain subject matter that was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention. Applicant respectfully traverses this rejection.

The Examiner stated that enablement requires that the specification teach those in the art to make and use the invention without undue experimentation, and lists the factors considered in determining whether a disclosure would require undue experimentation. The Examiner asserted that in view of the teachings of *In re Wands* (8 USPQ2d 1400 (CAFC 1988)), it has been

determined that the level of experimentation required to enable the breadth of the claims is undue.

Applicant has amended claim 1 to remove the recitation of "recombinant." Therefore, Applicant respectfully submits that the rejection of claims 1-17 under 35 U.S.C. §112, first paragraph, is moot.

Claim 6 stands rejected under 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter that Applicant regards as the invention.

Claim 6 has been canceled herein. Therefore, Applicants respectfully submit that the rejection of claim 6 under 35 U.S.C. §112, second paragraph, is moot.

CONCLUSION

Applicant asks that all claims be allowed. Enclosed is a Enter $ amount check for a Petition for Three-Month Extension of Time fee. Please apply any other charges or credits to Deposit Account No. 06-1050.

Respectfully submitted,

Date: 6/16/03

Dorothy P. Whelan
Reg. No. 33,814

Fish & Richardson P.C., P.A.
60 South Sixth Street
Suite 3300
Minneapolis, MN 55402
Telephone: (612) 335-5070
Facsimile: (612) 288-9696
60119994.doc

VERSION WITH MARKINGS TO SHOW CHANGES MADE

In the Specification:

The specification on page 27, lines 21-29 has been amended as follows:

Several types of interactions are involved in producing and stabilizing dimeric Concanavalin A (see Table II below) or tetrameric Concanavalin A (see Table III below). For example, Reeke *et al.*, *supra*, describe residues from four distinct regions of the Concanavalin A structure that participate in forming contacts between monomeric subunits in dimeric Concanavalin A. Based upon this structure, the four regions include amino acid residues: 87-90, 136-139, and 175-178 [(amino acid positions are by reference to the amino acid sequence data in Edelman et al., 1972, *Proc. Natl. Acad. Sci. U.S.A.*, 69:2580-4; Wang et al., 1975, *J. Biol. Chem.*, 250:1490-1502; and Cunningham et al., 1975, *J. Biol. Chem.*, 250:1503-12)], which are located in the front of the monomeric Concanavalin A subunit. In contrast, amino acid residues 117-132 are located at the back of the monomeric Concanavalin A subunit.

In the Claims:

Claims 6, 9, and 15-17 have been canceled.

Claims 1-3 and 7 have been amended as follows:

1. (Amended) A method for evaluating a carbohydrate in a sample, the method comprising:

(a) contacting a [recombinant] reduced valency carbohydrate binding ligand (CBL) with

(i) the carbohydrate in the sample and

(ii) a glycoconjugate that includes the carbohydrate; and

(b) determining the extent to which the [recombinant] reduced valency CBL binds the glycoconjugate, the extent of the binding being correlated with the amount of the carbohydrate in the sample.

2. (Amended) The method of claim 1, wherein the [recombinant] reduced valency CBL is a [recombinant] monomeric form of a multimeric protein.

3. (Amended) The method of claim 1, wherein the [recombinant] reduced valency CBL is a lectin.

7. (Amended) The method of claim 1, wherein at least one of the [recombinant] reduced valency CBL and the glycoconjugate include a detectable label.